TABLE 129

Federal obligations for research and development for selected agencies, by state or location: FYs 2012–20 (Dollars in millions)

State or location	2012	2013	2014	2015	2016	2017	2018	2019	2020
All locations	135,995.4	122,985.2	127,927.2	125,846.3	113,002.0	115,507.6	125,737.3	138,170.3	162,959.
Alabama	5,159.1	4,716.4	4,483.7	4,538.0	4,354.3	8,662.5	5,173.7	5,414.5	3,070.
Alaska	159.1	185.5	136.9	208.0	211.9	280.0	299.8	334.2	278.
Arizona	2,405.2	2,369.3	1,606.0	1,643.7	1,549.4	1,198.8	1,737.0	2,001.2	1,938.
Arkansas	183.8	167.3	190.9	105.6	307.5	170.0	206.2	179.0	501.
California	18,036.3	16,180.8	15,798.7	15,280.6	15,756.5	15,886.7	17,236.9	19,158.6	22,464.
Colorado	3,744.7	3,394.0	3,611.4	3,506.4	4,183.1	3,395.6	4,916.8	5,267.9	5,024.
Connecticut	2,231.1	2,516.6	2,287.0	2,292.8	2,365.9	2,349.3	2,568.2	2,673.2	2,566.
Delaware	108.7	112.3	130.1	108.1	142.0	168.6	161.6	163.1	221.
District of Columbia	3,339.3	3,908.1	3,980.1	4,221.7	4,204.5	4,867.4	6,157.7	6,228.2	16,314.
Florida	2,355.8	2,282.0	2,447.6	2,932.7	2,781.5	2,879.5	3,178.5	3,892.0	4,061.
Georgia	1,133.3	1,130.0	1,253.1	1,182.4	1,301.3	1,284.7	1,349.8	1,503.9	1,912.
Hawaii	382.5	348.0	326.5	305.4	283.8	275.4	441.3	411.9	393.
Idaho	446.9	380.8	597.9	532.6	568.4	679.1	824.2	919.9	840.
Illinois	2,399.5	2,327.5	2,368.6	2,482.7	3,922.1	2,552.9	2,911.1	2,998.3	3,209.
Indiana	838.3	692.6	771.2	678.3	719.1	689.8	781.3	894.1	1,104.
lowa	613.3	560.5	512.2	567.0	496.2	520.0	525.0	517.8	702
Kansas	231.6	234.3	187.1	193.7	187.9	211.6	232.8	282.6	352.
Kentucky	308.1	306.8	296.7	296.7	272.6	289.5	302.8	313.4	354
Louisiana	313.8	278.0	284.5	253.7	278.5	397.2	321.1	432.1	436
Maine	247.8	169.9	131.1	138.0	137.5	158.0	188.4	189.0	185.
Maryland	15,597.8	15,605.9	16,890.5	16,750.6	16,640.3	15,416.8	17,779.2	16,992.3	22,736
Massachusetts	6,279.3	5,690.8	6,268.5	6,055.0	5,532.6	5,238.4	6,036.0	6,837.8	8,850
Michigan	2,206.4	1,826.1	1,852.7	1,799.0	1,795.9	1,491.4	1,630.5	2,053.7	1,924.
Minnesota	961.1	939.7	947.4	817.4	859.1	985.8	1,031.0	1,029.4	1,447.
Mississippi	542.6	567.7	589.5	489.0	448.2	449.5	819.8	505.1	472
Missouri	1,122.8	1,056.3	1,038.6	1,296.3	1,258.6	1,603.8	1,492.0	2,375.1	2,079
Montana	190.2	134.5	170.5	152.2	169.5	151.0	194.7	191.4	213
Nebraska	261.9	200.5	234.1	216.4	204.8	210.6	211.3	243.7	254
Nevada	481.7	584.6	510.0	394.2	286.2	338.4	400.2	375.1	305
New Hampshire	490.7	296.2	335.9	342.1	373.5	351.1	472.4	669.3	483
New Jersey	2,167.0	1,726.9	1,968.5	1,631.9	1,676.6	1,962.6	2,367.3	2,834.4	2,885.
New Mexico	3,378.6	3,421.5	3,714.2	3,542.9	3,662.1	3,383.4	3,630.3	3,755.7	3,502
New York	4,727.2	4,605.2	4,580.6	4,566.9	4,743.8	4,954.5	5,366.1	6,162.3	8,148
North Carolina	1,922.3	1,759.2	1,880.5	1,892.0	1,906.2	2,005.4	2,270.1	2,417.4	3,271
North Dakota	88.1	89.5	80.5	82.0	103.6	74.8	110.7	73.0	140
Ohio	3,436.3	2,425.7	2,454.5	2,638.5	2,497.4	2,549.8	4,206.8	5,188.2	5,215.
Oklahoma	449.8	262.4	316.8	450.2	349.0	367.6	480.6	505.9	536
Oregon	632.1	529.0	601.5	557.5	543.8	572.5	626.8	696.9	814
Pennsylvania	3,724.9	3,295.4	3,695.3	3,710.5	3,980.6	3,787.5	4,147.6	4,092.5	5,214
Rhode Island	557.4	486.4	555.3	519.4	627.3	615.0	662.4	722.6	875
South Carolina	555.4	397.5	476.4	446.6	460.9	504.7	561.4	646.0	821
South Dakota	63.2	56.6	68.8	72.8	69.0	77.2	80.8	88.9	130
Tennessee	2,111.9	2,118.6	2,023.1	2,312.5	2,479.3	2,491.1	2,564.2	3,578.4	3,151.
Texas	5,619.7	5,234.2	4,678.4	5,574.5	5,296.5	5,318.9	4,677.3	5,067.5	6,135
Utah	972.3	918.6	1,221.8	1,143.6	937.7	1,057.5	1,109.7	1,301.1	1,140
Vermont	103.4	103.0	115.7	81.6	82.4	80.7	97.1	119.9	129
Virginia	8,130.0	6,487.5	7,651.7	7,487.1	7,383.6	6,310.9	7,187.2	8,028.9	9,650
Washington	2,757.4	3,433.5	3,565.3	2,361.7	2,083.8	2,623.7	2,746.0	3,195.3	3,280
West Virginia	263.3	171.4	208.0	239.5	455.5	141.4	280.5	141.9	150

TABLE 129

Federal obligations for research and development for selected agencies, by state or location: FYs 2012–20

(Dollars in millions)

State or location	2012	2013	2014	2015	2016	2017	2018	2019	2020
Wisconsin	734.3	654.0	701.1	700.7	722.7	729.5	759.4	839.5	907.9
Wyoming	75.6	41.2	45.8	53.5	43.7	45.8	48.6	67.6	86.7
Outlying areas	193.0	228.6	318.0	347.1	331.1	104.1	496.1	520.7	195.5
Puerto Rico	71.3	82.6	71.0	65.9	71.8	67.6	74.7	81.8	88.1
Other areas ^a	121.6	146.1	247.0	281.3	259.3	36.5	421.4	438.9	107.4
Offices abroad ^b	91.6	165.5	38.0	28.3	3.7	1.8	12.3	4.3	47.9
Undistributed ^C	20,468.0	15,210.8	16,728.5	15,624.4	969.2	2,593.9	1,666.5	3,073.1	1,829.2

^a Includes American Samoa, Baker Island, Guam, Howland Island, Jarvis Island, Johnston Atoll, Kingman Reef, Midway Islands, Navassa Island, Northern Mariana Islands, Palmyra Atoll, U.S. Virgin Islands, and Wake Island.

Note(s):

Because of rounding, detail may not add to total. Eleven agencies are required to report data for this section of the survey: the Departments of Agriculture, Commerce, Defense, Energy, Health and Human Services, Homeland Security, the Interior, and Transportation; the Environmental Protection Agency: the National Aeronautics and Space Administration; and the National Science Foundation. Obligations of these 11 agencies represented more than 97% of total federal R&D obligations in FY 2020. Although the nongeographic historical tables incorporate corrections to previously reported data that have been submitted by reporting agencies, corresponding corrections to geographic distributions are rarely obtainable. Starting with volume 62 (FYs 2012-14), an "undistributed" category was added to the geographic location tables for DOD obligations for which the location of performance is not reported. It includes DOD obligations for industry R&D that were included in individual state totals prior to FY 2012 and DOD obligations for other performers that were not reported prior to FY 2011. This change was applied retroactively to FY 2011 data. Geographic distribution of DOD development funding to industry reflects location of prime contractors and not the numerous subcontractors who perform much of the R&D. Beginning with FY 2016, the totals reported for development obligations represent a refinement to this category by more narrowly defining it to be "experimental development." Most notably, totals for development do not include the DOD Budget Activity 7 (Operational Systems Development) obligations. Those funds, previously included in DOD's development obligation totals, support the development efforts to upgrade systems that have been fielded or have received approval for full rate production and anticipate production funding in the current or subsequent fiscal year. Therefore, the data are not directly comparable with totals reported in previous years. FY 2020 obligations include additional funding provided by supplemental COVID-19 related appropriations (e.g., Coronavirus Aid, Relief, and Economic Security [CARES] Act). See technical table A-2 for additional notes associated with the agencies listed in this table.

Source(s):

National Center for Science and Engineering Statistics, Survey of Federal Funds for Research and Development.

^b Includes R&D performed or administered in foreign countries by the U.S. government.

^c Undistributed totals include Department of Defense (DOD) obligations for which the location of performance is not reported. It includes DOD obligations for industry R&D that were included in individual state totals prior to FY 2012 and obligations for other performers that were not reported prior to FY 2011. The undistributed total for FY 2019 also include Department of Health and Human Services' Biomedical Advanced Research and Development Authority obligations for which the location of performance could not be reported.